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**Montana Fish,
Wildlife & Parks**

MONTANA ANIMAL SPECIES OF CONCERN

JULY 2006

INTRODUCTION

This report is produced jointly by the Montana Natural Heritage Program (MTNHP) and Montana Department of Fish, Wildlife, and Parks (MFWP). **Montana Animal Species of Concern** are native Montana animals that are considered to be “at risk” due to declining population trends, threats to their habitats, and/or restricted distribution. Also included in this report are **Potential Animal Species of Concern** — animals for which current, often limited, information suggests potential vulnerability or for which additional data are needed before an accurate status assessment can be made. Designation of a species as a Montana Animal Species of Concern or Potential Animal Species of Concern is not a statutory or regulatory classification. Instead, these designations provide a basis for resource managers and decision-makers to direct limited resources to priority data collection needs and address conservation needs proactively.

Status determinations are made by MTNHP and MFWP biologists in consultation with representatives of the Montana Chapter of the Wildlife Society, the Montana Chapter of the American Fisheries Society and other experts. The process for evaluating and assigning status designations uses the Natural Heritage Program ranking system, described below, which forms the basis for identifying Montana Species of Concern.

This report identifies 123 vertebrate and 73 invertebrate Species of Concern (SOC). Another 34 vertebrates and 56 invertebrates are identified as Potential Species of Concern (PSOC). See the animal group summary table below for

totals by animal group. Four species included on the 2004 SOC report have been dropped from consideration because taxonomic research determined that these species designations are not valid: Flathead Pondsail (*Stagnicola erodi*); Largemouth Pondsail (*Stagnicola erodiana*); Mountain Marshsail (*Stagnicola montanensis*); and Shorthead Sculpin (*Cottus confusus*). Russell’s Mantleslug (*Udosarx lyrata russelli*) was also dropped from consideration because it is not presently distinguishable from the Lyre Mantleslug (*Udosarx lyrata*). One invertebrate species, Fir Pinwheel (*Radiodiscus abietum*) has been down ranked to a PSOC as a result of recent survey records. Four vertebrate species are new to this SOC report as a result of the documentation indicated: Northern Short-tailed Shrew (*Blarina brevicauda*) – restricted distribution; Western Spotted Skunk (*Spilogale gracilis*) – rarity and growing evidence for declines; Idaho Giant Salamander (*Dicamptodon aterrimus*) – restricted distribution; and native Lake Trout (*Salvelinus namaycush*) – declining population trends, threats, and restricted distribution. Eighteen invertebrate species are new to this SOC report (1 freshwater sponge, 2 slugs, 1 crayfish, 8 millipedes, and 6 insects) as a result of recent documentation of rarity, endemism, or declines. Five invertebrate species are new to this PSOC report (1 freshwater sponge, 2 slugs, and 2 insects) as a result of recent documentation of rarity and/or restricted distribution. The large number of invertebrate additions to this report are a result of thorough review of the scientific literature, collection records, and recent systematic surveys for these invertebrate groups. Other invertebrate groups

SPECIES TOTALS BY ANIMAL GROUP Species of Concern

Mammals	29
Birds	60
Reptiles	9
Amphibians	6
Fish	19
Invertebrates	73

Potential Species of Concern

Mammals	8
Birds	18
Fish	8
Invertebrates	56

HABITAT ASSOCIATION SUMMARY FOR ALL SPECIES OF CONCERN AND POTENTIAL SPECIES OF CONCERN

Streams/Rivers/Lakes	27%
Wetlands	20%
Sagebrush/Grassland	14%
Conifer Forest	13%
Riparian Forest	7%
Other/Generalist	6%
Alpine	5%
Rock Outcrop	5%
Caves	3%

(e.g., earthworms, centipedes, spiders) deserve similar attention, but due to the amount of time required, systematic reviews of the status of these groups will have to be dealt with in future updates.

In order to make this report more useful, we have added habitat associations for each species and summarize the percentage of animal SOC and PSOC that are dependent on major habitat types on front and back pages.

HERITAGE PROGRAM RANKS

The international network of Natural Heritage Programs employs a standardized ranking system to denote global and state status. Each species is given a global (G) rank, denoting range-wide status, and a state (S) rank for its status in Montana. Status ranks range from 1 (greatest concern) to 5 (least concern). Global ranks are assigned by scientists at NatureServe (the international affiliate organization for the heritage network) in consultation with biologists in the natural heritage programs and other taxonomic experts. State ranks are determined jointly by MTNHP and MFWP biologists, in consultation with the Montana Chapter of the Wildlife Society, the Montana Chapter of the American Fisheries Society and other experts. Among other things, the combination of global and state ranks often helps describe the proportion of a species' range and/or total population occurring in Montana. For instance, a rank of G3 S3 often indicates that Montana comprises most or a very significant portion of an animal's total population. In contrast, an animal ranked G5 S1 often occurs in Montana at the periphery of its much larger range; thus, the state supports a relatively small portion of its total population.

What Species are Included in this Report

Montana Species of Concern are defined as vertebrate animals with a state rank of S1, S2, or S3. Vertebrate species with a rank indicating uncertainty (SU) or a "range rank" extending below the S3 cutoff (e.g., S3S4) are considered Potential Species of Concern.

Because documentation for invertebrates is typically less complete than for vertebrates, only those ranked S1 or S2 are included as SOC. Invertebrates with a range rank extending below S2 (e.g., S2S3) are included as SOC only if their global ranks are G1, G2, or G3 or if experts agree their occurrence in Montana has been adequately documented. All other invertebrates with global ranks other than G1, G2, or G3 and with state ranks below S2 or range ranks extending below S2 (e.g., S3S4) are treated as Potential Species of Concern.

How Species are Ranked

In 2004 we began implementing a more rigorous methodology with more consistent and quantifiable criteria to assign status ranks. The goal is to improve the accuracy of ranks and better document the basis for each rank. A

more rigorous and well-documented ranking procedure is important to a variety of agencies with responsibilities to manage wildlife populations.

This new approach to assessing species' status is based on methods developed by NatureServe (Regan et al. 2004). These criteria include population size, area of occupancy in Montana, short and long-term trends, threats, inherent vulnerability, and specificity to environment. Based on these factors, a preliminary rank is calculated and is reviewed by key experts.

It is important to note that while the ranking process has changed, the definitions and the fundamental criteria remain the same. The principle difference is that criteria are now being applied in a more rigorous and consistent manner. Detailed documentation of the criteria and assessment process are available on the MTNHP website at http://mtnhp.org/animal/2004_SOC_Criteria.pdf. This status assessment process was completed for all of Montana's amphibian, reptile and mammal species in 2004. Bird, fish, and invertebrate species will be systematically assessed in future revisions.

Definitions of Ranks used in this Report

- G1/S1 At high risk because of extremely limited and/or rapidly declining numbers, range, and/or habitat, making it highly vulnerable to global extinction or extirpation in the state.
- G2/S2 At risk because of very limited and/or declining numbers, range, and/or habitat, making it vulnerable to global extinction or extirpation in the state.
- G3/S3 Potentially at risk because of limited and/or declining numbers, range, and/or habitat, even though it may be abundant in some areas.
- G4/S4 Uncommon but not rare (although it may be rare in parts of its range), and usually widespread. Apparently not vulnerable in most of its range, but possibly cause for long-term concern.
- G5/S5 Common, widespread, and abundant (although it may be rare in parts of its range). Not vulnerable in most of its range.
- GU/SU Currently unrankable due to lack of information or due to substantially conflicting information about status or trends.
- GH/SH Historically occurred; may be rediscovered.
- GX/SX Believed to be extinct; historical records only.

Other codes and rank modifiers:

B/N	State rank modifier indicating breeding for a migratory species; B = Breeding. N = Nonbreeding.
HYB	A global rank denoting a hybrid.
M	A state rank modifier indicating migratory stopover status for a species.
Q	A global rank modifier indicating that there are taxonomic questions or problems.
T	Denotes the rank for a subspecific taxon (subspecies or population); appended to the global rank for the full species. The S Rank following applies to the subspecific taxon.

HOW TO READ THIS REPORT

Species are listed alphabetically by common name within major groups, which are organized in taxonomic order from mammals to invertebrates. Species with names **bolded** and underlined are new additions to the Species of Concern or Potential Species of Concern report. Species downgraded from Concern to Potential Concern are not shown as new. Global or state ranks are **bolded** and underlined if they have changed from the previous report.

Current federal agency status designations are also provided, including legal status under the U.S. Endangered Species Act, and administrative designations of the U.S. Forest Service and Bureau of Land Management. Conservation and inventory status of species in Montana's Comprehensive Fish and Wildlife Conservation Strategy (MFWP 2005) are also provided.

Federal Status Designations

FISH AND WILDLIFE SERVICE

This column indicates status under the federal Endangered Species Act of 1973 based on categories defined by the U.S. Fish and Wildlife Service (16 U.S.C.A. §1531-1543 (Supp. 1996)).

E	Listed Endangered
T	Listed Threatened
PE	Proposed Endangered
PT	Proposed Threatened
XN	Experimental Nonessential
C	Candidate (species for which the U.S. Fish and Wildlife Service has sufficient information on biological status and threats to propose listing as threatened or endangered)

FOREST SERVICE

The U.S. Forest Service Manual (2670.22) defines Sensitive species on Forest Service lands as those for which

population viability is a concern as evidenced by significant downward trend in population or a significant downward trend in habitat capacity. The Regional Forester (Northern Region) designates Sensitive species on National Forests in Montana. These designations were last updated in 2004 and they apply only on USFS-administered lands.

Note: The U.S. Forest Service is implementing new planning regulations (2005) which will lead to changes in the identification of "special status" species on National Forest lands. For the time being, Sensitive species will continue to be recognized for Region 1 under existing agency policy, but in addition many of the newly revised Forest Plans may also identify USFS Species of Concern and USFS Species of Interest as outlined below. During this transition period, a "USFS" designation in the federal status column refers to the status under the existing Sensitive Species policy.

USFS Species-of-Concern (FSH 1909.12, 43.22b) are species for which the Responsible Official determines management actions may be necessary to prevent listing under the Endangered Species Act (ESA). The Responsible Official, as appropriate, may identify the following plant and animal species, including macro-lichens, as species-of-concern:

1. Species identified as proposed and candidate species under the ESA.
2. Species with ranks of G-1 through G-3 on the NatureServe ranking system.
3. Intraspecific (subspecific) taxa with ranks of T-1 through T-3 on the NatureServe ranking system.
4. Species that have been petitioned for federal listing and for which a positive "90-day finding" has been made (a 90-day finding is a preliminary finding that substantive information was provided indicating that the petition listing may be warranted and a full status review will be conducted).
5. Species that have been recently delisted (these include species delisted within the past five years and other delisted species for which regulatory agency monitoring is still considered necessary).

USFS Species-of-Interest (FSH 1909.12, 43.22c) are species for which the Responsible Official determines that management actions may be necessary or desirable to achieve ecological or other multiple-use objectives. The Responsible Official may review the following sources for potential species-of-interest:

1. Species with ranks of S-1, S-2, N1, or N2 on the NatureServe ranking system.
2. State listed threatened and endangered species that do not meet the criteria as species-of-concern.
3. Species identified as species of conservation concern in State Comprehensive Wildlife Strategies.
4. Bird species on the U.S. Fish and Wildlife Service Birds of Conservation Concern National Priority list

(for the U.S. portion of the northern Rockies that occur on National Forest system lands).

5. Additional species that valid existing information indicates are of regional or local conservation concern (this includes all Forest Service Northern Region sensitive species) due to factors that may include:
 - a. Significant threats to populations or habitat.
 - b. Declining trends in populations or habitat.
 - c. Rarity
 - d. Restricted ranges (for example, narrow endemics, disjunct populations, or species at the edge of their range).
6. Species that are hunted or fished and other species of public interest. Invasive species may also be considered.

BUREAU OF LAND MANAGEMENT

The BLM 6840 Manual defines the status of Sensitive species on Bureau of Land Management lands as those that are proven imperiled in at least part of their ranges and are documented to occur on BLM lands. These designations were last updated in 2004 and they apply only on BLM-administered lands.

MONTANA FISH, WILDLIFE, AND PARKS COMPREHENSIVE FISH AND WILDLIFE CONSERVATION STRATEGY

Montana's Comprehensive Fish and Wildlife Conservation Strategy (MFWP 2005) identifies fish and wildlife species that are in greatest need of conservation as follows:

- Tier I: Greatest conservation need. Montana Fish, Wildlife & Parks has a clear obligation to use its resources to implement conservation actions that provide direct benefit to these species, communities, and focus areas.
- Tier II: Moderate conservation need. Montana Fish, Wildlife & Parks could use its resources to implement conservation actions that provide direct benefit to these species, communities, and focus areas.
- Tier III: Lower conservation need. Although important to Montana's wildlife diversity, these species, communities, and focus areas are either abundant and widespread or are believed to have adequate conservation already in place.
- Tier IV: Species that are non-native, incidental, or on the periphery of their range and are either expanding or very common in adjacent states.

The Comprehensive Fish and Wildlife Conservation Strategy (MFWP 2005) also identifies individual species and taxonomic groups that are in need of inventory.

Each species' conservation and inventory tiering status is indicated in roman numerals before and after a dash, respectively.

ADDITIONAL INFORMATION

Our internet-based Field Guide to Montana's Animals

Our internet-based Field Guide to Montana's Animals provides information on over 600 vertebrate species, including Species of Concern and Potential Species of Concern. The Field Guide offers a broad range of information, including species identification, range, habitat, reproduction, food habits, ecology, management, and references. For many Species of Concern, the Field Guide provides extensive detailed information from the databases of MTNHP. Photos and call recordings are provided where available.

The Field Guide can be accessed through the Natural Heritage Program web page at mtnhp.org and the Montana Fish, Wildlife and Parks web page at www.fwp.mt.gov. The MTNHP website also offers access to a variety of bird observations (other animal species will soon be added), statewide aerial photos, topographic maps, and land ownership information through its new Natural Heritage Information Portal where anyone can enter and access statewide bird observation data.

The NatureServe Explorer website provides information on the status of species throughout North America. It can be found at www.natureserve.org/explorer or from a link on the MTNHP website. This application includes status maps showing the state/provincial ranks across each species' range, assembled from the network of natural heritage programs. Note that updated ranks for Montana animals will not be immediately reflected in NatureServe Explorer since this information is only exchanged on an annual basis.

More detailed data on the occurrence of Montana Species of Concern are available on request from MTNHP, using the "Request Data" link on the website or by contacting appropriate staff. This report is available in electronic format on the MTNHP website under "Reports." Hard copies are available on request from MTNHP or from MFWP (see contact information on back cover).

Comments and Feedback

We welcome comments and suggestions, including recommendations for changes in species' status and new observation data. All comments and information should be directed to the MTNHP Senior Zoologist, Bryce Maxell, at bmaxell@mt.gov or at the address below. Please submit observations using forms available on the MTNHP website (select "Animals" then "Submit Observation"). Bird observation data can be submitted through the Natural Heritage Information Portal on the new Montana Bird Distribution website.

SELECTED REFERENCES

- Abbott, J.C. 2006. OdonataCentral: An online resource for the Odonata of North America. Austin, TX. (Accessed: June 01, 2006). <http://www.odonatacentral.com>
- Brown, C.J.D. 1971. Fishes of Montana. Bozeman, MT: Montana State University. 207 p.
- Flath, D.L. 1984. Vertebrate species of special interest or concern. Helena, MT: Montana Department of Fish, Wildlife and Parks. 76 p.
- Flath, D.L. 1998. Species of special interest or concern. Helena, MT: Montana Department of Fish, Wildlife and Parks. 7 p.
- Frest, T.J. and E.J. Johannes. 1995. Interior Columbia Basin mollusk species of special concern. Final report to the Interior Columbia Basin Ecosystem Management Project, Walla Walla, WA. 274 p. plus appendices.
- Foresman, K.R. 2001. The wild mammals of Montana. Special Publication No. 12. Lawrence, KS: The American Society of Mammalogists. 278 p.
- Hand, R.L. 1969. A distributional checklist of the birds of western Montana. 55 p. Unpublished manuscript available from the Montana State Library, Helena, MT 59620.
- Hendricks, P., B.A. Maxell, S. Lenard, C. Currier, and J. Johnson. 2006. Riparian bat surveys in eastern Montana. Report to the USDI Bureau of Land Management, Montana State Office. Helena, MT: Montana Natural Heritage Program. 13 p. + appendices.
- Hendricks, P., B.A. Maxell and S. Lenard. 2006. Land mollusk surveys on USFS Northern Region Lands. A report to the USDA Forest Service, Northern Region. Helena, MT: Montana Natural Heritage Program. 11 p. + appendices.
- Hoffman, R.L. 1999. Checklist of the millipeds of North and Middle America. Special Publication No. 8. Martinsville, VA: Virginia Museum of Natural History. 584 p.
- Hoffman, R.S. and D.L. Pattie. 1968. A guide to Montana mammals. Missoula, MT: University of Montana Printing Services. 133 p.
- Holton, G.D., and H.E. Johnson. 2003. A field guide to Montana fishes. Third Edition. Helena, MT: Montana Department of Fish, Wildlife, and Parks. 95 p.
- Kohler, S. 1980. Checklist of Montana butterflies (Rhopalocera). Journal of the Lepidopterists' Society 34(1):1-19.
- Lenard, S., J. Carlson, J. Ellis, C. Jones, and C. Tilly. 2003. P.D. Skaar's Montana bird distribution, Sixth edition. Helena, MT: Montana Audubon. 144 p.
- Lewis, J.J. 2001. Three new species of subterranean assellids from western North America, with a synopsis of the species of the region (Crustacea: Isopoda: Asellidae). Texas Memorial Museum, Speleological Monographs 5:1-15.
- Maxell, B.A., J.K. Werner, P. Hendricks, and D. Flath. 2003. Herpetology in Montana: a history, status summary, checklists, dichotomous keys, accounts for native, potentially native, and exotic species, and indexed bibliography. Olympia, WA: Society for Northwestern Vertebrate Biology. Northwest Fauna 5: 1-138.
- Miller, K.B. and D.L. Gustafson. 1996. Distribution records of the Odonata of Montana. Bulletin of American Odonatology 3(4):75-88.
- [Montana Fish Wildlife and Parks]. 2005. Montana's comprehensive fish and wildlife conservation strategy. Helena, MT: Montana Fish, Wildlife & Parks. 658 p.
- [MTNHP] Montana Natural Heritage Program and [MFWP] Montana Fish Wildlife and Parks. 2004. Montana animal species of concern. Helena, MT: Montana Natural Heritage Program and Montana Department of Fish Wildlife and Parks. 11p.
- Opler, P.A., H. Pavulaan, and R.E. Stanford (coordinators). 1995. Butterflies of North America. Jamestown, ND: Northern Prairie Wildlife Research Center Home Page. (Version 12DEC2003, Accessed June 01, 2006). <http://www.npwrc.usgs.gov/resource/distr/lepid/bflyusa/bflyusa.htm>
- Paulson, D.R., and D. Nunnallee. 2005. Range maps of western dragonflies. Tacoma, WA: Slater Museum of Natural History (Accessed: June 01, 2006). <http://www.ups.edu/x7035.xml>
- Regan, T.J., L.L. Master, and G.A. Hammerson. 2004. Capturing expert knowledge for threatened species assessments: a case study using NatureServe conservation status ranks. Acta Oecologica 26:95-107.
- Roemhild, G. 1975. The damselflies (Zygoptera) of Montana. Montana Agricultural Experiment Station Research Report 87. Bozeman, MT: Montana State University. 53 p.
- Saunders, A.A. 1921. A distributional list of the birds of Montana with notes on the migration and nesting of the better known species. Pacific Coast Avifauna Number 14. Berkeley, CA: Cooper Ornithological Club. 194 p.
- Thompson, L.S. 1982. Distribution of Montana amphibians, reptiles, and mammals. Helena, MT: Montana Audubon Council. 24 p.
- Wang, D., and J.R. Holsinger. 2001. Systematics of the subterranean amphipod genus *Stygobromus* (Crangonyctidae) in western North America, with emphasis on the hubbsi group. Amphipacifica 3:39-147.
- Werner, J.K., B.A. Maxell, D. Flath, and P. Hendricks. 2004. Amphibians and reptiles of Montana. Missoula, MT: Mountain Press Publishing Company. 262 p.
- Westfall, M.J., Jr., and M.L. May. 1996. Damselflies of North America. Gainesville, FL: Scientific Publishers. 650 p.
- Westfall, M.J. Jr., and M.L. May. 2000. Dragonflies of North America, Revised Edition Gainesville, FL: Scientific Publishers. 940 p.
- Wright, P.L. 1996. Status of rare birds in Montana with comments on known hybrids. Northwest Naturalist 77(3):57-85.

PREFERRED CITATION

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SPECIES OF CONCERN

Vertebrates

Common Name	Scientific Name	Global Rank	State Rank	Federal Status	CFWCS Status	Habitat
Mammals						
American Bison (free-ranging herds)	<i>Bos bison</i>	G4	S2		I - III	grasslands
Arctic Shrew	<i>Sorex arcticus</i>	G5	S1S3		II - I	wetlands
Black-footed Ferret	<i>Mustela nigripes</i>	G1	S1	USFWS - E, XN	I - III	grasslands
Black-tailed Jack Rabbit	<i>Lepus californicus</i>	G5	S2		II - I	sagebrush/grasslands
Black-tailed Prairie Dog	<i>Cynomys ludovicianus</i>	G3G4	S3	USFS, BLM	I - III	grasslands
Brown Bear	<i>Ursus arctos</i>	G4	S2S3	USFWS - T	I - III	generalist
Canada Lynx	<i>Lynx canadensis</i>	G5	S3	USFWS - T	I - III	subalpine conifer forests
Dwarf Shrew	<i>Sorex nanus</i>	G4	S2S3		II - II	rocky habitats
Eastern Red Bat	<i>Lasiurus borealis</i>	G5	S2S3		II - I	riparian cottonwoods
Fisher	<i>Martes pennanti</i>	G5	S3	USFS, BLM	II - II	mixed conifer forests
Fringed Myotis	<i>Myotis thysanodes</i>	G4G5	S3	BLM	II - II	riparian & dry mixed conifer forests
Gray Wolf	<i>Canis lupus</i>	G4	S3	USFWS - E (N), XN (S)	I - III	generalist
Great Basin Pocket Mouse	<i>Perognathus parvus</i>	G5	S2S3	USFS, BLM	I - II	sagebrush/grasslands
Hispid Pocket Mouse	<i>Chaetodipus hispidus</i>	G5	S1S3		II - I	grasslands
Meadow Jumping Mouse	<i>Zapus hudsonius</i>	G5	S2	BLM	I - I	wetlands
Merriam's Shrew	<i>Sorex merriami</i>	G5	S3		II - II	sagebrush/grasslands
North American Wolverine	<i>Gulo gulo luscus</i>	G4T4	S3	USFS, BLM	II - III	conifer forests
Northern Bog Lemming	<i>Synaptomys borealis</i>	G4	S2	USFS, BLM	I - I	wetlands
Northern Myotis	<i>Myotis septentrionalis</i>	G4	S2S3	BLM	II - I	riparian & mixed forest types
Northern Short-tailed Shrew	<i>Blarina brevicauda</i>	G5	S1S3		-	wetlands
Pallid Bat	<i>Antrozous pallidus</i>	G5	S2	USFS, BLM	I - I	arid land rock outcrops
Preble's Shrew	<i>Sorex preblei</i>	G4	S3	BLM	II - II	sagebrush/grasslands
Pygmy Rabbit	<i>Brachylagus idahoensis</i>	G4	S3	USFS, BLM	I - II	sagebrush
Spotted Bat	<i>Euderma maculatum</i>	G4	S2	USFS, BLM	I - I	arid land rock outcrops
Swift Fox	<i>Vulpes velox</i>	G3	S3	BLM	II - II	grasslands
Townsend's Big-eared Bat	<i>Corynorhinus townsendii</i>	G4	S2	USFS, BLM	I - I	caves in forested habitats
Uinta Chipmunk	<i>Tamias umbrinus</i>	G5	S3		II - I	high elevation conifer forests
Western Spotted Skunk	<i>Spilogale gracilis</i>	G5	S1S3		II - I	shrublands/woodlands, rock outcrops
White-tailed Prairie Dog	<i>Cynomys leucurus</i>	G4	S1	USFS, BLM	I - III	sagebrush/grasslands
Birds						
Alder Flycatcher	<i>Empidonax alnorum</i>	G5	S1B		II - I	wetlands/shrublands
American White Pelican	<i>Pelecanus erythrorhynchos</i>	G3	S3B		III - III	lakes
Baird's Sparrow	<i>Ammodramus bairdii</i>	G4	S2B	BLM	II - III	grasslands
Bald Eagle	<i>Haliaeetus leucocephalus</i>	G5	S3	USFWS - T	I - III	riparian forest

Common Name	Scientific Name	Global Rank	State Rank	Federal Status	CFWCS Status	Habitat
Birds (continued)						
Barn Owl	<i>Tyto alba</i>	G5	S1		IV - I	sagebrush/grasslands
Black Rosy-Finch	<i>Leucosticte atrata</i>	G4	S2		II - I	alpine
Black Swift	<i>Cypseloides niger</i>	G4	S3B		II - I	cliffs/waterfalls
Black Tern	<i>Chlidonias niger</i>	G4	S3B	BLM	I - II	wetlands
Black-and-white Warbler	<i>Mniotilta varia</i>	G5	S2S3B		II - I	deciduous forests
Black-backed Woodpecker	<i>Picoides arcticus</i>	G5	S2	USFS, BLM	I - III	conifer forest burns
Black-crowned Night-heron	<i>Nycticorax nycticorax</i>	G5	S3B		II - I	wetland/lake w/ emergent vegetation
Blue-gray Gnatcatcher	<i>Poliophtila caerulea</i>	G5	S1B	USFS, BLM	II - I	utah juniper
Bobolink	<i>Dolichonyx oryzivorus</i>	G5	S2B		III - III	moist grasslands
Boreal Chickadee	<i>Poecile hudsonica</i>	G5	S1S2		II - II	spruce fir forests
Brewer's Sparrow	<i>Spizella breweri</i>	G5	S2B	BLM	II - III	sagebrush
Broad-tailed Hummingbird	<i>Selasphorus platycercus</i>	G5	S1B		II - II	montane shrublands/woodlands
Burrowing Owl	<i>Athene cunicularia</i>	G4	S2B	USFS, BLM	I - III	grasslands
Caspian Tern	<i>Hydroprogne caspia</i>	G5	S2B		II - II	large rivers and lakes
Cassin's Kingbird	<i>Tyrannus vociferans</i>	G5	S2B		II - II	grasslands
Chestnut-collared Longspur	<i>Calcarius ornatus</i>	G5	S3B		III - III	grasslands
Columbian Sharp-tailed Grouse	<i>Tympanuchus phasianellus columbianus</i>	G4T3	S1		I - I	grasslands
Common Loon	<i>Gavia immer</i>	G5	S2B	USFS, BLM	I - III	mountain lakes w/ emergent veg.
Common Tern	<i>Sterna hirundo</i>	G5	S3B		II - II	large rivers and lakes
Dickcissel	<i>Spiza americana</i>	G5	S1S2B	BLM	II - II	tall grasslands
Eastern Bluebird	<i>Sialia sialis</i>	G5	S2B		II - I	prairie woodlands
Ferruginous Hawk	<i>Buteo regalis</i>	G4	S2B	BLM	II - III	sagebrush/grasslands
Flammulated Owl	<i>Otus flammeolus</i>	G4	S3B	USFS, BLM	I - III	conifer forest
Forster's Tern	<i>Sterna forsteri</i>	G5	S2B		II - II	wetlands
Franklin's Gull	<i>Larus pipixcan</i>	G4G5	S3B	BLM	II - II	wetland/lake w/ emergent vegetation
Grasshopper Sparrow	<i>Ammodramus savannarum</i>	G5	S3B		II - III	grasslands
Gray-crowned Rosy-Finch	<i>Leucosticte tephrocotis</i>	G5	S2B, S5N		II - II	alpine
Great Gray Owl	<i>Strix nebulosa</i>	G5	S3	BLM	II - III	conifer forest
Greater Sage-Grouse	<i>Centrocercus urophasianus</i>	G4	S3	USFS, BLM	I - III	sagebrush
Harlequin Duck	<i>Histrionicus histrionicus</i>	G4	S2B	USFS, BLM	I - III	mountain streams
Interior Least Tern	<i>Sternula antillarum athalassos</i>	G4T2Q	S1B	USFWS - E	I - III	large prairie rivers
Lark Bunting	<i>Calamospiza melanocorys</i>	G5	S3B		II - III	sagebrush/grasslands
Le Conte's Sparrow	<i>Ammodramus leconteii</i>	G4	S1S2B	BLM	II - I	prairie wetlands
Lewis's Woodpecker	<i>Melanerpes lewis</i>	G4	S2B		II - II	riparian forest
Loggerhead Shrike	<i>Lanius ludovicianus</i>	G4	S3B	BLM	II - II	shrublands
Long-billed Curlew	<i>Numenius americanus</i>	G5	S2B	BLM	I - II	grasslands

Common Name	Scientific Name	Global Rank	State Rank	Federal Status	CFWCS Status	Habitat
Birds (continued)						
McCown's Longspur	<i>Calcarius mccownii</i>	G4	S2B	BLM	II - III	grasslands
Mountain Plover	<i>Charadrius montanus</i>	G2	S2B	BLM	I - III	grasslands
Nelson's Sharp-tailed Sparrow	<i>Ammodramus nelsoni</i>	G5	S1B		I - I	prairie wetlands
Northern Goshawk	<i>Accipiter gentilis</i>	G5	S3	USFS, BLM	II - I	mixed conifer forest
Northern Hawk Owl	<i>Surnia ulula</i>	G5	S1		III - I	conifer forest
Olive-sided Flycatcher	<i>Contopus cooperi</i>	G4	S3B		I - III	early seral forest/shrub patches
Peregrine Falcon	<i>Falco peregrinus</i>	G4	S2B	USFS, BLM	II - III	cliffs
Piping Plover	<i>Charadrius melodus</i>	G3	S2B	USFWS - T	I - III	prairie lake and river shorelines
Red-headed Woodpecker	<i>Melanerpes erythrocephalus</i>	G5	S3B		II - II	riparian forest
Sage Sparrow	<i>Amphispiza belli</i>	G5	S1S3B	BLM	III - III	sagebrush
Sage Thrasher	<i>Oreoscoptes montanus</i>	G5	S3B	BLM	III - III	sagebrush
Sedge Wren	<i>Cistothorus platensis</i>	G5	S1B	BLM	I - I	prairie wetlands
Sprague's Pipit	<i>Anthus spragueii</i>	G4	S2B	BLM	II - III	grasslands
Swainson's Hawk	<i>Buteo swainsoni</i>	G5	S3B	BLM	II - II	sage/grassland w/ woody vegetation
Trumpeter Swan	<i>Cygnus buccinator</i>	G4	S2	BLM	I - III	shallow lakes
Western Yellow-billed Cuckoo	<i>Coccyzus americanus occidentalis</i>	G5T3Q	S1S2B	USFWS - C	II - I	riparian forest
White-faced Ibis	<i>Plegadis chihi</i>	G5	S1B	BLM	II - I	wetland/lake w/ emergent vegetation
White-tailed Ptarmigan	<i>Lagopus leucurus</i>	G5	S3		II - III	alpine
Whooping Crane	<i>Grus americana</i>	G1	S1M	USFWS - E	I - III	wetlands
Yellow Rail	<i>Coturnicops noveboracensis</i>	G4	S1B	BLM	I - I	wetlands
Yellow-billed Cuckoo	<i>Coccyzus americanus</i> (E. pop.)	G5	S3B		II - I	prairie riparian forests
Reptiles						
Greater Short-horned Lizard	<i>Phrynosoma hernandesi</i>	G5	S3	USFS, BLM	II - II	sandy/gravelly soils
Milk Snake	<i>Lampropeltis triangulum</i>	G5	S2	USFS, BLM	I - I	rock outcrops
Northern Alligator Lizard	<i>Elgaria coerulea</i>	G5	S3		II - I	talus/rock outcrops
Sagebrush Lizard	<i>Sceloporus graciosus</i>	G5	S3		II - II	rock outcrops
Smooth Green Snake	<i>Opheodrys vernalis</i>	G5	S2		I - I	wetlands
Snapping Turtle	<i>Chelydra serpentina</i>	G5	S3	BLM	I - I	prairie streams and rivers
Spiny Softshell	<i>Apalone spinifera</i>	G5	S3	BLM	I - I	prairie rivers & larger streams
Western Hognose Snake	<i>Heterodon nasicus</i>	G5	S2	USFS, BLM	I - I	floodplain friable soils
Western Skink	<i>Eumeces skiltonianus</i>	G5	S3		II - I	rock outcrops
Amphibians						
Coeur d'Alene Salamander	<i>Plethodon idahoensis</i>	G4	S2	USFS, BLM	I - I	spring/seep, waterfall, fractured rock
Great Plains Toad	<i>Bufo cognatus</i>	G5	S2	USFS, BLM	II - I	wetlands, floodplain pools
Idaho Giant Salamander	<i>Dicamptodon aterrimus</i>	G3	S1S3	USFS	-	mountain streams, moist conifer forest
Northern Leopard Frog	<i>Rana pipiens</i> (Great Plains)	G5	S3	USFS, BLM	I - I	wetlands, floodplain pools

Common Name	Scientific Name	Global Rank	State Rank	Federal Status	CFWCS Status	Habitat
Amphibians (continued)						
Northern Leopard Frog	<i>Rana pipiens</i> (Intermountain valleys)	G5	S1	USFS, BLM	I - I	wetlands, floodplain pools
Plains Spadefoot	<i>Spea bombifrons</i>	G5	S3	USFS, BLM	II - I	wetlands, floodplain pools
Western Toad	<i>Bufo boreas</i>	G4	S2	USFS, BLM	I - I	wetlands, lakes, floodplain pools
Fish						
Arctic Grayling	<i>Thymallus arcticus</i>	G5	S1	USFWS - C	I - III	mountain rivers, lakes
Blue Sucker	<i>Cycleptus elongatus</i>	G3G4	S2S3	BLM	I - III	large prairie rivers
Bull Trout	<i>Salvelinus confluentus</i>	G3	S2	USFWS - T	I - III	mountain streams, rivers, lakes
Columbia River Redband Trout	<i>Oncorhynchus mykiss gairdneri</i>	G5T4	S1	USFS	I - III	mountain streams, rivers
Lake Trout (Native)	<i>Salvelinus namaycush</i>	G5	S2		I - I	deep mountain lakes
Northern Redbelly X Finescale Dace	<i>Phoxinus eos x Phoxinus neogaeus</i>	HYB	S3	BLM	II - II	small prairie streams
Paddlefish	<i>Polyodon spathula</i>	G4	S1S2	BLM	I - III	large prairie rivers
Pallid Sturgeon	<i>Scaphirhynchus albus</i>	G1	S1	USFWS - E	I - II	large prairie rivers
Pearl Dace	<i>Margariscus margarita</i>	G5	S2	BLM	I - I	small prairie streams
Sauger	<i>Sander canadensis</i>	G5	S2	BLM	I - III	large prairie rivers
Shortnose Gar	<i>Lepisosteus platostomus</i>	G5	S1	BLM	I - I	large prairie rivers
Sicklefin Chub	<i>Macrhybopsis meeki</i>	G3	S1	BLM	I - II	large prairie rivers
Spoonhead Sculpin	<i>Cottus ricei</i>	G5	S3		II - I	mountain streams, rivers, lakes
Sturgeon Chub	<i>Macrhybopsis gelida</i>	G3	S2	USFS, BLM	I - II	large prairie rivers
Torrent Sculpin	<i>Cottus rhotheus</i>	G5	S3		II - I	mountain streams
Trout-perch	<i>Percopsis omiscomaycus</i>	G5	S2		I - I	deep lakes, mountain streams
Westslope Cutthroat Trout	<i>Oncorhynchus clarki lewisi</i>	G4T3	S2	USFS, BLM	I - III	mountain streams, rivers, lakes
White Sturgeon	<i>Acipenser transmontanus</i>	G4T1Q	S1	USFWS - E	I - III	large mountain rivers
Yellowstone Cutthroat Trout	<i>Oncorhynchus clarki bouvieri</i>	G4T2	S2	USFS, BLM	I - III	mountain streams, rivers, lakes

Invertebrates

Mollusks						
A Spring Snail	<i>Pyrgulopsis bedfordensis</i>	G1	S1		-	springs
Alpine Mountainsnail	<i>Oreohelix alpina</i>	G1	S1		-	limestone talus, alpine
Berry's Mountainsnail	<i>Oreohelix strigosa berryi</i>	G5T2	S1S2		-	limestone talus
Bitterroot Mountainsnail	<i>Oreohelix amariadix</i>	G1G2	S1S2		-	talus, dry conifer forests
Carinate Mountainsnail	<i>Oreohelix elrodi</i>	G1	S1		-	talus, mixed mesic conifer forests
Gallatin Mountainsnail	<i>Oreohelix yavapai mariae</i>	G4T1	S1		-	limestone talus
Humped Coin	<i>Polygyrella polygyrella</i>	G3	S1S3		-	moist conifer forests
Keeled Mountainsnail	<i>Oreohelix carinifera</i>	G1	S1		-	limestone, dry conifer forests
Lake Disc	<i>Discus brunsoni</i>	G1	S1		-	talus, mesic conifer forests
Large-mantle Physa	<i>Physa megalochlamys</i>	G3	S1		-	wetland/lake w/ emergent vegetation

Common Name	Scientific Name	Global Rank	State Rank	Federal Status	CFWCS Status	Habitat
Mollusks (continued)						
Lyre Mantleslug	<i>Udosarx lyrata</i>	G2	S1		-	moist conifer forests
Magnum Mantleslug	<i>Magnipelta mycophaga</i>	G3	S1S3		-	moist conifer forests
Marbled Jumping-slug	<i>Hemphillia danielsi</i>	G2G3	S1S3		-	mesic/moist conifer forests
Pygmy Slug	<i>Kootenaia burkei</i>	G2	S1S2		-	moist conifer forests
Robust Lancetooth	<i>Haplotrema vancouverense</i>	G5	S1S2		-	moist conifer forests
Rocky Mountain Capshell	<i>Acroloxus coloradensis</i>	G3	S1		-	lakes
Rocky Mountain Dusksnail	<i>Colligyrus greggi</i>	G4	S1		-	springs, cold mountain streams
Sheathed Slug	<i>Zacoleus idahoensis</i>	G3G4	S2S3		-	mesic/moist conifer forests
Shortface Lanx	<i>Fisherola nuttalli</i>	G2	S1S3		-	lakes
Smoky Tailedropper	<i>Prophysaon humile</i>	G3	S1S3		-	moist conifer forests
Striate Disc	<i>Discus shimekii</i>	G5	S1		-	aspen
Crustaceans						
Glacier Amphipod	<i>Stygobromus glacialis</i>	G1G3	S1S2		-	cave springs
A cave obligate Amphipod	<i>Stygobromus montanensis</i>	G1G2	S1S2		-	cave springs
A cave obligate Amphipod	<i>Stygobromus obscurus</i>	G1G2	S1S2		-	cave springs
A cave obligate Amphipod	<i>Stygobromus puteanus</i>	G1G2	S1S2		-	cave springs
A cave obligate Amphipod	<i>Stygobromus tritus</i>	G1G2	S1S2		-	cave springs
A cave obligate Isopod	<i>Salmasellus steganothrix</i>	G2G3	S1S2		-	cave springs
A Crayfish	<i>Pacifastacus gambelii</i>	G4G5	S1		-	mountain rivers
Insects						
Beetles						
Brown's Microcylloepus Riffle Beetle	<i>Microcylloepus browni</i>	G1	S1		-	springs
Warm Spring Zaitzevian Riffle Beetle	<i>Zaitzevia thermae</i>	G1	S1	USFWS - C	-	springs
Butterflies						
Alberta Fritillary	<i>Boloria alberta</i>	G3	S2S3		-	alpine
Frigga Fritillary	<i>Boloria frigga</i>	G5	S1S2		-	montane wetlands
Gillett's Checkerspot	<i>Euphydryas gillettii</i>	G2G3	S2		-	wet meadows
Gray Comma	<i>Polygonia progne</i>	G5	S2		-	parklands
Magdalena Alpine	<i>Erebia magdalena</i>	G5	S2		-	alpine
Ottoo Skipper	<i>Hesperia ottoe</i>	G3G4	S2S3		-	grasslands
Caddisflies						
A Caddisfly	<i>Rhyacophila ebria</i>	G2G3	S1		-	mountain streams
A Rhyacophilan Caddisfly	<i>Rhyacophila glaci</i>	G3	S1		-	mountain/alpine streams
A Rhyacophilan Caddisfly	<i>Rhyacophila newelli</i>	G2	S2?		-	mountain streams
Alexander's Rhyacophilan Caddisfly	<i>Rhyacophila alexanderi</i>	G2	S2		-	mountain/alpine streams
An Agapetus Caddisfly	<i>Agapetus montanus</i>	G2	S2		-	mountain/alpine streams

Common Name	Scientific Name	Global Rank	State Rank	Federal Status	CFWCS Status	Habitat
Insects (continued)						
Damselflies						
Last Best Place Damselfly	<i>Enallagma optimolocus</i>	G1G3Q	S1S3		-	wetlands
Subarctic Bluet	<i>Coenagrion interrogatum</i>	G5	S1S2		-	wetlands
Dragonflies						
Boreal Whiteface	<i>Leucorrhinia borealis</i>	G5	S1		-	wetlands
Brimstone Clubtail	<i>Stylurus intricatus</i>	G4	S1		-	large prairie rivers
Brush-tipped Emerald	<i>Somatochlora walshii</i>	G5	S1S2		-	wetlands
Eastern Ringtail	<i>Erpetogomphus designatus</i>	G5	S1		-	large prairie rivers
Subarctic Darner	<i>Aeshna subarctica</i>	G5	S1S2		-	wetlands
Western Pondhawk	<i>Erythemis collocata</i>	G5	S1S2		-	wetlands
Mayflies						
A Mayfly	<i>Caenis youngi</i>	G4	S2		-	sloughs/backwaters
A Mayfly	<i>Homoeoneuria alleni</i>	G4	S2		-	large prairie rivers
A Mayfly	<i>Lachlania saskatchewanensis</i>	G4	S1		-	large prairie rivers
A Mayfly	<i>Macdunnoa nipawinia</i>	G1G3	S2		-	large prairie rivers
A Mayfly	<i>Raptoheptagenia cruentata</i>	G4	S2		-	large prairie rivers
A Sand-dwelling Mayfly	<i>Anepeorus rusticus</i>	G1G2	S1		-	large prairie rivers
Springtails						
A Springtail	<i>Oncopodura cruciata</i>	G1G2	S1S2		-	caves
Stoneflies						
A Stonefly	<i>Isocapnia crinita</i>	G4	S2		-	alpine streams
A Stonefly	<i>Isocapnia integra</i>	G4	S2		-	alpine streams
A Stonefly	<i>Isoperla petersoni</i>	G5	S2		-	mountain streams
A Stonefly	<i>Utacapnia columbiana</i>	G4	S2		-	alpine streams
A Stonefly	<i>Zapada cordillera</i>	G3	S2		-	mountain streams
Meltwater Lednian Stonefly	<i>Lednia tumana</i>	G1	S1		-	alpine streams
Western Glacier Stonefly	<i>Zapada glacier</i>	G2	S1		-	alpine streams
Other - Spiders, Sponges, Millipedes						
A cave obligate Harvestman	<i>Cryptobunus cavicolus</i>	G1G2	S1S2		-	caves
A Freshwater Sponge	<i>Clypeatula cooperensis</i>	G1G3	S1S3		-	lakes
A Millipede	<i>Adirityla cucullata</i>	G1G3	S1S3		-	dry mixed conifer forest clearings
A Millipede	<i>Austrotyla montani</i>	G1G3	S1S3		-	mixed conifer forests
A Millipede	<i>Corypus cochlearis</i>	G1G3	S1S3		-	mixed conifer forests
A Millipede	<i>Endopus parvipes</i>	G1G3	S1S3		-	subalpine mixed conifer forests
A Millipede	<i>Lophomus laxus</i>	G1G3	S1S3		-	mixed conifer forests
A Millipede	<i>Orophe cabinetus</i>	G1G3	S1S3		-	moist mixed conifer forests

Common Name	Scientific Name	Global Rank	State Rank	Federal Status	CFWCS Status	Habitat
Other - Spiders, Sponges, Millipedes (continued)						
<u>A Millipede</u>	<i>Orthogmus oculatus</i>	G1G3	S1S3		-	mixed conifer forests
<u>A Millipede</u>	<i>Taiyutyla curvata</i>	G1G3	S1S3		-	moist mixed conifer forests

POTENTIAL SPECIES OF CONCERN

Vertebrates

Common Name	Scientific Name	Global Rank	State Rank	Federal Status	CFWCS Status	Habitat
Mammals						
Hayden's Shrew	<i>Sorex haydeni</i>	G4	S3S4		II - II	sagebrush/grasslands
Hoary Bat	<i>Lasiurus cinereus</i>	G5	S3S4		II - II	riparian and forest habitats
Hoary Marmot	<i>Marmota calagata</i>	G5	S3S4		I - I	alpine/subalpine meadow/rock outcrop
Idaho Pocket Gopher	<i>Thomomys idahoensis</i>	G4	S2S4		II - I	sagebrush/grasslands in deep soils
Silver-haired Bat	<i>Lasionycteris noctivagans</i>	G5	S3S4		II - II	riparian and forest habitats
Uinta Ground Squirrel	<i>Spermophilus armatus</i>	G5	S3S4		II - I	subalpine meadows
Wyoming Ground Squirrel	<i>Spermophilus elegans</i>	G5	S3S4		II - I	sagebrush/grasslands, rock outcrops
Yuma Myotis	<i>Myotis yumanensis</i>	G5	S3S4		II - II	riparian and mixed forest habitats
Birds						
American Three-toed Woodpecker	<i>Picoides dorsalis</i>	G5	S3S4		II - III	mixed conifer forests
Baltimore Oriole	<i>Icterus galbula</i>	G5	S3S4B		II - II	prairie riparian forests
Black-billed Cuckoo	<i>Coccyzus erythrophthalmus</i>	G5	S3S4B		II - I	prairie riparian forests
Black-necked Stilt	<i>Himantopus mexicanus</i>	G5	S3S4B		III - II	wetlands
Chimney Swift	<i>Chaetura pelagica</i>	G5	S3S4B		III - I	human habitation
Clark's Grebe	<i>Aechmophorus clarkii</i>	G5	S2S4B		III - II	large lakes
Common Poorwill	<i>Phalaenoptilus nuttallii</i>	G5	S3S4B		III - I	open conifer woodlands
Eastern Screech-Owl	<i>Megascops asio</i>	G5	S3S4		III - II	prairie riparian forests
Great Blue Heron	<i>Ardea herodias</i>	G5	S3S4		III - III	riparian woodlands
Horned Grebe	<i>Podiceps auritus</i>	G5	S4		II - II	large lakes
Indigo Bunting	<i>Passerina cyanea</i>	G5	S2S4B		II - I	shrublands
Orchard Oriole	<i>Icterus spurius</i>	G5	S2S4B		III - II	prairie riparian forests
Ovenbird	<i>Seiurus aurocapilla</i>	G5	S3S4B		III - III	mixed conifer forests
Plumbeous Vireo	<i>Vireo plumbeus</i>	G5	S3S4B		-	conifer forest and riparian
Short-eared Owl	<i>Asio flammeus</i>	G5	S3S4		III - II	grasslands
Tennessee Warbler	<i>Vermivora peregrina</i>	G5	S2S4B		III - III	mixed conifer forests
Western Screech-Owl	<i>Megascops kennicottii</i>	G5	S3S4		III - III	western riparian forest
Williamson's Sapsucker	<i>Sphyrapicus thyroideus</i>	G5	S3S4B		II - III	mixed conifer forests
Fish						
Brassy Minnow	<i>Hybognathus hankinsoni</i>	G5	SU		III - I	small prairie rivers
Brook Stickleback	<i>Culaea inconstans</i>	G5	SU		III - III	small prairie rivers
Burbot	<i>Lota lota</i>	G5	SU		I - II	large rivers/lakes
Creek Chub	<i>Semotilus atromaculatus</i>	G5	SU		III - II	small prairie rivers
Iowa Darter	<i>Etheostoma exile</i>	G5	SU		III - I	small prairie rivers
Northern Red-bellied Dace	<i>Phoxinus eos</i>	G5	SU		III - II	small prairie rivers

Common Name	Scientific Name	Global Rank	State Rank	Federal Status	CFWCS Status	Habitat
Fish (continued)						
Plains Minnow	<i>Hybognathus placitus</i>	G4	SU		III - I	small & large prairie rivers
Pygmy Whitefish	<i>Prosopium coulteri</i>	G5	SU		III - III	lakes

Invertebrates

Mollusks						
Fir Pinwheel	<i>Radiodiscus abietum</i>	G4	S2S3		-	moist conifer forests
Pale Jumping-slug	<i>Hemphillia camelus</i>	G4	S1S3		-	mesic/moist conifer forests
Reticulate Tailedropper	<i>Prophysaon andersoni</i>	G5	S1S3		-	moist conifer forests
Threeridge Valvata	<i>Valvata tricarnata</i>	G5	S2S3		-	large coldwater rivers
Western Pearlshell	<i>Margaritifera falcata</i>	G4	S2S4		-	mountain streams/rivers
Insects						
Beetles						
Coppery Tiger Beetle	<i>Cicindela cuprascens</i>	G5	S3		-	sandy beaches
Sandy Tiger Beetle	<i>Cicindela limbata</i>	G5	S3		-	sandy sagbrush/grasslands
Butterflies						
Astarte Fritillary	<i>Boloria astarte</i>	G5	S2S3		-	alpine
Colorado Alpine	<i>Erebia callias</i>	G5	S2S3		-	alpine
Eyed Brown	<i>Satyrodes eurydice</i>	G4	S2S3		-	wetlands
Freija Fritillary	<i>Boloria freija</i>	G5	S3S5		-	subalpine willows
Giant Sulfur	<i>Colias gigantea</i>	G5	S3		-	montane willows
Indra Swallowtail	<i>Papilio indra</i>	G5	S2S3		-	grasslands/rock outcrops
Labrador Sulfur	<i>Colias nastes</i>	G5	S2S3		-	alpine
Melissa Arctic	<i>Oeneis melissa</i>	G5	S2S3		-	alpine
Mormon Metalmark	<i>Apodemia mormo</i>	G5	S3S5		-	sagebrush/grasslands
Northern Marble	<i>Euchloe creusa</i>	G5	S1S3		-	subalpine forest openings
Red-disked Alpine	<i>Erebia discaidalis</i>	G5	S3S5		-	grasslands
Rockslide Checkerspot	<i>Chlosyne whitneyi</i>	G4G5	S3S5		-	alpine
Tawny Crescent	<i>Phyciodes batesii</i>	G4	S2S3		-	grasslands
White Admiral	<i>Limenitis arthemis</i>	G5	S2S3		-	riparian forest
White-veined Arctic	<i>Oeneis bore</i>	G5	S2S3		-	alpine
Damselflies						
Alkali Bluet	<i>Enallagma clausum</i>	G5	S2S4		-	wetland/lake w/ emergent vegetation
Arroyo Bluet	<i>Enallagma praevarum</i>	G5	S3S5		-	wetland/lake w/ emergent vegetation
Emma's Dancer	<i>Argia emma</i>	G5	S3S5		-	wetland/lake w/ emergent vegetation
Familiar Bluet	<i>Enallagma civile</i>	G5	S2S4		-	wetland/lake w/ emergent vegetation
Paiute Dancer	<i>Argia alberta</i>	G4	S2S3		-	wetland/lake w/ emergent vegetation
Prairie Bluet	<i>Coenagrion angulatum</i>	G5	S1S3		-	small prairie streams/wetlands

Common Name	Scientific Name	Global Rank	State Rank	Federal Status	CFWCS Status	Habitat
Insects (continued)						
Damselflies (continued)						
River Jewelwing	<i>Calopteryx aequabilis</i>	G5	S3S4		-	western slow and clear streams
Vivid Dancer	<i>Argia vivida</i>	G5	S3S5		-	wetland/lake w/ emergent vegetation
Black-tipped Darner	<i>Aeshna tuberculifera</i>	G4	S2S4		-	wetland/lake w/ emergent vegetation
Blue-eyed Darner	<i>Aeshna multicolor</i>	G5	S2S4		-	wetland/lake w/ emergent vegetation
Dragonflies						
California Darner	<i>Aeshna californica</i>	G5	S3S5		-	wetland/lake w/ emergent vegetation
Chalk-fronted Corporal	<i>Ladona julia</i>	G5	S3S4		-	wetland/lake w/ emergent vegetation
Common Whitetail	<i>Libellula lydia</i>	G5	S3S5		-	wetland/lake w/ emergent vegetation
Crimson-ringed Whiteface	<i>Leucorrhinia glacialis</i>	G5	S3		-	wetland/lake w/ emergent vegetation
Eight-spotted Skimmer	<i>Libellula forensis</i>	G5	S3S5		-	wetland/lake w/ emergent vegetation
Flame Skimmer	<i>Libellula saturata</i>	G5	S2S4		-	wetland/lake w/ emergent vegetation
Horned Clubtail	<i>Arigomphus cornutus</i>	G4	S2S4		-	large prairie rivers
Hudsonian Emerald	<i>Somatochlora hudsonica</i>	G5	S2S4		-	wetland/lake w/ emergent vegetation
Lake Darner	<i>Aeshna eremita</i>	G5	S3S4		-	wetland/lake w/ emergent vegetation
Lance-tipped Darner	<i>Aeshna constricta</i>	G5	S1S3		-	wetland/lake w/ emergent vegetation
Mountain Emerald	<i>Somatochlora semicircularis</i>	G5	S3S5		-	wetlands
Ocellated Emerald	<i>Somatochlora minor</i>	G5	S2S4		-	wetland/lake w/ emergent vegetation
Plains Clubtail	<i>Gomphus externus</i>	G5	S2S4		-	large prairie rivers
Pronghorn Clubtail	<i>Gomphus graslinellus</i>	G5	S3S5		-	large prairie rivers
Red-veined Meadowhawk	<i>Sympetrum madidum</i>	G4	S2S3		-	wetland/lake w/ emergent vegetation
Ringed Emerald	<i>Somatochlora albicincta</i>	G5	S1S3		-	wetlands
Sedge Darner	<i>Aeshna juncea</i>	G5	S3S5		-	wetlands
Sinuuous Snaketail	<i>Ophiogomphus occidentis</i>	G4	S2S4		-	large cold rivers
Spiny Baskettail	<i>Epithea spinigera</i>	G5	S3S5		-	wetland/lake w/ emergent vegetation
Twelve-spotted Skimmer	<i>Libellula pulchella</i>	G5	S3S5		-	large prairie rivers
Zigzag Darner	<i>Aeshna sitchensis</i>	G5	S2S3		-	large prairie rivers
Mayflies						
<u>A Sand-dwelling Mayfly</u>	<i>Anaetris eximia</i>	G2G4	S3		-	large prairie rivers
<u>Lolo Mayfly</u>	<i>Caurinella idahoensis</i>	G1G3	S3		-	small mountain streams
Sponges						
<u>A Freshwater Sponge</u>	<i>Heteromeyenia baileyi</i>	G5	S1S3		-	lakes

HABITAT ASSOCIATION SUMMARIES BY ANIMAL GROUP FOR SPECIES OF CONCERN AND POTENTIAL SPECIES OF CONCERN

Mammals

Sagebrush/Grassland.....	38%
Riparian Forest.....	16%
Conifer Forest.....	11%
Rock Outcrop.....	11%
Wetlands.....	11%
Alpine.....	5%
Other/Generalist.....	5%
Caves.....	3%

Birds

Sagebrush/Grassland.....	27%
Conifer Forest.....	15%
Riparian Forest.....	15%
Wetlands.....	15%
Streams/Rivers/Lakes.....	13%
Other/Generalist.....	10%
Alpine.....	5%

Reptiles

Rock Outcrop.....	44%
Streams/Rivers/Lakes.....	22%
Other/Generalist.....	22%
Wetlands.....	12%

Amphibians

Wetlands.....	83%
Streams/Rivers/Lakes.....	17%

Fish

Mountain Streams/Rivers/Lakes.....	44%
Prairie Streams/Rivers/Lakes.....	56%

Invertebrates

Streams/Rivers/Lakes.....	29%
Wetlands.....	28%
Conifer Forest.....	15%
Alpine.....	6%
Caves.....	6%
Other/Generalist.....	5%
Rock Outcrop.....	5%
Sagebrush/Grassland.....	5%
Riparian Forest.....	1%

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